Application/Control Number: 10/086,102

Art Unit: 2624

AMENDMENTS TO THE CLAIMS

Docket No.: 2001-0370

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1. (currently amended) A method for coding image data, the method comprising: converting a block of image data into transform coefficients;

quantizing the transform coefficients such that all, some, or none of the transform coefficients become zero;

constructing a single entity indicating which transform coefficients are non-zero; and coding the single entity as an integer using one of a semi-adaptive arithmetic coder or a non-adaptive an arithmetic coder wherein the values of the transform coefficients are coded in any fixed order.

- 2-4. (cancelled)
- 5. (original) The method for coding image data of claim 1, wherein each transform coefficient is coded according to its own context, based on the transform coefficient.
- 6. (original) The method for coding image data of claim 2, wherein each transform coefficient is coded according to its own context, based on the transform coefficient.
- 7. (original) The method for coding image data of claim 1, wherein the single entity is a bit vector.
 - 8 12. (cancelled)
- 13. (currently amended) A bitstream of data generated by a method of coding data, the method comprising:

converting a block of image data into transform coefficients;

quantizing the transform coefficients such that all, some, or none of the transform coefficients become zero;

constructing a single entity indicating which transform coefficients are non-zero; and

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coding the single entity as an integer using one of a semi-adaptive arithmetic coder or a non-adaptive an arithmetic coder wherein the values of the transform coefficients are coded

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in any fixed order.

14 - 16. (cancelled)

17. (original) The apparatus of claim 13, wherein the single entity is a bit vector.

18. (currently amended) A computer-readable medium that stores instructions

for controlling the operation of a computer device to perform data coding according to a

method comprising the steps of:

converting a block of image data into transform coefficients;

quantizing the transform coefficients such that all, some, or none of the transform

coefficients become zero;

constructing a single entity indicating which transform coefficients are non-zero; and

coding the single entity as an integer using one of a semi-adaptive arithmetic coder or

a non-adaptive an arithmetic coder wherein the values of the transform coefficients are coded

in any fixed order.

19 - 21. (cancelled)

22. (original) The computer-readable medium of claim 18, wherein the single entity

is a bit vector.

23. (currently amended) A method of coding data not having a clearly defined

relationship, the method comprising:

converting the data into transform coefficients;

quantizing the transform coefficients such that all, some or none of the transform

coefficients become zero;

constructing a single entity from the quantized transform coefficients; and

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coding the single entity using one of a semi-adaptive arithmetic coder or a non-adaptive an arithmetic coder wherein the values of the transform coefficients are coded in any fixed order.

24. (original) The method of claim 23, wherein the single entity is a bit vector.

25. (currently amended) A method of decoding a bitstream, the bitstream being coded using a single entity coded as an integer using one of a semi-adaptive arithmetic coder or a non-adaptive an arithmetic coder, the method comprising:

decoding the single entity wherein the values of transform coefficients are decoded in any fixed order;

deconstructing the single entity to determine which coefficients are non-zero;

dequantizing the transform coefficients to determine whether all, some or none of the coefficients are zero; and

converting the dequantized transform coefficients into block image data.

26. (original) The method of decoding a bitstream of claim 25, wherein the single entity is a bit vector.

27 - 29. (cancelled)

30. (currently amended) A computing device that codes an image, the computing device comprising:

a module configured to convert a block of image data into transform coefficients; a module configured to quantize the transform coefficients such that all, some, or none of the transform coefficients become zero;

a module configured to construct a single entity indicating which transform coefficients are non-zero; and

a module configured to code the single entity as an integer using one of a semiadaptive arithmetic coder or a non-adaptive an arithmetic coder wherein the values of the transform coefficients are coded in any fixed order. Application/Control Number: 10/086,102 Art Unit: 2624 Docket No.: 2001-0370

31 - 33. (cancelled)

34. (previously presented) The computing device of claim 30, wherein the single entity is a bit vector.